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| APPLICATION NO.      | FILING DATE                         | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|----------------------|-------------------------------------|----------------------|---------------------|------------------|
| 10/593,824           | 11/30/2006                          | John Greg Hancock    | 14072 US00          | 4632             |
|                      | 7590 10/22/200<br>VIS & BOCKIUS LLP |                      | EXAMINER            |                  |
| 1111 PENNSY          | LVANIA AVENUE N                     |                      | EDWARDS, NEWTON O   |                  |
| WASHINGTON, DC 20004 |                                     |                      | ART UNIT            | PAPER NUMBER     |
|                      |                                     |                      | 1794                |                  |
|                      |                                     |                      |                     |                  |
|                      |                                     |                      | MAIL DATE           | DELIVERY MODE    |
|                      |                                     |                      | 10/22/2009          | PAPER            |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

|  | Application No.   | Applicant(s)   |  |  |  |  |
|--|---|----------------|--|--|--|--|
| Office Action Symmetry   | 10/593,824  | HANCOCK ET AL. |  |  |  |  |
| Office Action Summary  | Examiner  | Art Unit       |  |  |  |  |
|  | N. EDWARDS  | 1794           |  |  |  |  |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address<br>Period for Reply  |   |                |  |  |  |  |
| A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b). |   |                |  |  |  |  |
| Status   |   |                |  |  |  |  |
| 1)⊠ Responsive to communication(s) filed on <u>01 Security</u>   | entember 2000   |                |  |  |  |  |
|  |   |                |  |  |  |  |
| <i>;</i> —   | , <del></del>   |                |  |  |  |  |
|  | closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. |                |  |  |  |  |
| closed in accordance with the practice under Ex pane Quayle, 1935 C.D. 11, 455 O.G. 215.   |   |                |  |  |  |  |
| Disposition of Claims  |   |                |  |  |  |  |
| 4)⊠ Claim(s) <u>1-21</u> is/are pending in the application.  | Claim(s) 1-21 is/are pending in the application.  |                |  |  |  |  |
|  | 4a) Of the above claim(s) <u>4,5,7 and 9-21</u> is/are withdrawn from consideration.              |                |  |  |  |  |
| 5) Claim(s) is/are allowed.  |   |                |  |  |  |  |
| 6) Claim(s) <u>1-3,6 and 8</u> is/are rejected.  |   |                |  |  |  |  |
| 7) Claim(s) is/are objected to.  | ·   |                |  |  |  |  |
| · · · · · · · · · · · · · · · · · · ·  | r election requirement  |                |  |  |  |  |
| 8) Claim(s) are subject to restriction and/or election requirement.  |   |                |  |  |  |  |
| Application Papers   |   |                |  |  |  |  |
| 9)☐ The specification is objected to by the Examiner.  |   |                |  |  |  |  |
| 10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.   |   |                |  |  |  |  |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  |   |                |  |  |  |  |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).   |   |                |  |  |  |  |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.   |   |                |  |  |  |  |
| Priority under 35 U.S.C. § 119   |   |                |  |  |  |  |
|  |   |                |  |  |  |  |
| a) ☐ All b) ☐ Some * c) ☐ None of:   | 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).   |                |  |  |  |  |
| ,— ,— ,—   |   |                |  |  |  |  |
|  | 1. Certified copies of the priority documents have been received.                                 |                |  |  |  |  |
| 2. Certified copies of the priority documents have been received in Application No   |   |                |  |  |  |  |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage  |   |                |  |  |  |  |
| application from the International Bureau (PCT Rule 17.2(a)).  |   |                |  |  |  |  |
| * See the attached detailed Office action for a list of the certified copies not received.   |   |                |  |  |  |  |
|  |   |                |  |  |  |  |
|  |   |                |  |  |  |  |
| Attachment(s)  |   |                |  |  |  |  |
| 1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)  |   |                |  |  |  |  |
| 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  3) Notice of Draftsperson's Patent Drawing Review (PTO-948)  Paper No(s)/Mail Date  Notice of Informal Patent Application   |   |                |  |  |  |  |
| Paper No(s)/Mail Date <u>9/22/06,12/10/07,9/17/08,12/3/08</u> . 6) Other:  |   |                |  |  |  |  |
|  |   |                |  |  |  |  |

Application/Control Number: 10/593,824

Art Unit: 1794

1. Applicant's election of group I, claims 1-8 in the reply filed on 8/17/09 and 9/1/09 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)). Claims 4 ,5,and 7are withdrawn from consideration by the Primary Examiner, as being drawn to a nonelected invention due to Applicant election of species. In accordance with Applicant election of species requirement, Grergory Lowen elected PET for claim 2, PBT for claim 6, and adipic acid for claim 3. As presented, group II will be rejoined with Group I under MPEP821.04(b) if it contains all the limitations of the allowable claim (not yet determined). Thus, the restriction is deemed proper for reason(s) of record and hereby made Final.

Page 2

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1 is rejected under 35 U.S.C. 102(b) as being clearly anticipated by Bruner (US 2003/0005997).

Burner teaches yarn comprising a polyester core fiber and a thermoplastic polyester sheath where in the melting point of the sheath is at least about 10 degree C lower than the core wherein the core or sheath can have electrical conductive material. See Fig 1, claims 1,2,6, paragraphs 10, 27, and 28, for example.

Application/Control Number: 10/593,824

Art Unit: 1794

4. Claims 1,2,4,6,8 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Asher (US 5,776,608).

Page 3

Asher teaches a drawn electrically conductive sheath core fiber comprising a PET(polyethylene terephthalate) core and a PBT (polybutylene terephthalate) sheath having carbon black, for example. See claim 1, example 1 and example 2. Regarding the issue of difference in melt point with PET and PBT in claim 1, the Primary Examiner has a reason to believe that the melt point difference as recited in claim 1 is inherently possesses in Asher fiber due to the same structural identity (PET and PBT) as claimed.

5. Claims 1,2,4,6,8 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Asher '148 (US 5,698,148).

Asher '148 is applied for the same reason given above for Asher supra which is hereby incorporated by reference, since there disclosures are substantially the same.

6. Claims1, 2, 4,6,and 8 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Breznak (US 6,242,094).

Breznak teaches a drawn bicomponent sheath core fiber having a core of PET and a sheath of PBT filled with carbon (generic and included any and all carbon such as graphite or carbon black). See claims 1,7,10, 11,12,and 13 for example. Regarding the issue of difference in melt point with PET and PBT in claim 1, the Primary Examiner has a reason to believe that the melt point difference as recited in claim 1 is inherently possesses in Asher fiber due to the same structural identity (PET and PBT) as claimed.

Application/Control Number: 10/593,824

Art Unit: 1794

7. Claims 1, 2, 4,6,and 8 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Breznak '506 (US 5,916,506).

Page 4

Breznak '506 is applied for the same reason given above for Breznak supra which is hereby incorporated by reference, since there disclosures are substantially the same. Regarding the issue of difference in melt point (with PET and PBT) in claim 1, the Primary Examiner has a reason to believe that the melt point difference as recited in claim 1 is inherently possesses in Asher fiber due to the same structural identity (PET and PBT) as claimed.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

8. Claims 1,2,3 and 8 are rejected under 35 U.S.C. 102(e) as being clearly anticipated by Iguro (US 6,710,242).

Iguro teaches carbon black containing sheath core fiber comprising a sheath of carbon black in a first polyester and a core having a second polyester such as PET with adipic acid modifier to copolymerize the polyester. See example 1, col. 4 lines 59-67, and claim1 and 4.

Regarding the issue of difference in melt point (with PET and PBT) in claim 1, the Primary Examiner has a reason to believe that the melt point difference as recited in claim 1 is inherently possesses in Asher fiber due to the same structural identity (PET and PBT) as claimed.

Application/Control Number: 10/593,824 Page 5

Art Unit: 1794

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.

Patentability shall not be negatived by the manner in which the invention was made.

10. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Breznak

'506 (US 5,916,506) or Breznak (US 6,242,094) or Asher '148 (US 5,698,148) or Asher

(US 5,776,608) taken with Iguro (US 6,710,242).

Breznak, Asher'148, Asher, and Breznak (hereafter called Primary references) is

applied for the same reason given above which is hereby incorporated by reference.

The Primary references teach all of the claimed invention except using an adipic acid

modifier with PET(polyester).

Iguro teaches is well known in the art of bicomponent fibers (sheath core fibers) to treat

PET with an adipic acid modifier in order to copolymerize the PET.

Thus, it would have been obvious to one having ordinary skill in the art to combine the

adipic acid, as taught by Iguro, with the Polyester, as taught by the Primary references,

in order to copolymer the polyester.

No claims are allowed.

Application/Control Number: 10/593,824 Page 6

Art Unit: 1794

Any inquiry concerning this communication should be directed to Primary Examiner Edwards at telephone number (571)272-1521.

/N Edwards/ Primary Examiner Art Unit 1794